

**CLAIMS**

What is claimed is:

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1. A method for management of a distributed data processing system, wherein the distributed data processing system is managed on behalf of a plurality of management customers, the method comprising:

10 representing the distributed data processing system as a set of scopes, wherein a scope comprises a logical organization of network-related objects;

15 associating each scope with a management customer, wherein each scope is uniquely assigned to a management customer, wherein each scope is uniquely associated with a set of configuration parameters for managing each scope;

20 managing the distributed data processing system as a set of logical networks, wherein a logical network comprises a set of scopes, and wherein each logical network is uniquely assigned to a management customer; and

25 allowing an administrative user to dynamically reconfigure logical networks within the distributed data processing system.

2. The method of claim 1 further comprising:

30 dynamically reconfiguring the distributed data processing system to introduce a new scope by logically dividing a pre-existing scope.

3. The method of claim 2 wherein the new scope is introduced without physically introducing a new network, system, or endpoint to the distributed data processing system.

4. The method of claim 1 further comprising:  
dynamically reconfiguring the distributed data  
processing system by logically moving a scope between  
management customers.

5. The method of claim 1 further comprising:  
dynamically reconfiguring the distributed data  
processing system to introduce a new management customer.

10 6. The method of claim 5 wherein the new management  
customer is introduced without physically introducing a new  
network, system, or endpoint to the distributed data  
processing system.

15 7. The method of claim 1 further comprising:  
dynamically discovering endpoints, systems, and  
networks within the distributed data processing system;  
correspondingly representing endpoints, systems, and  
20 networks within the distributed data processing system as a  
set of endpoint objects, system objects, and network  
objects; and  
logically organizing the endpoint objects, system  
objects, and network objects within a set of scopes, wherein  
25 each endpoint object, each system object, and each network  
object is uniquely assigned to a scope such that scopes do  
not logically overlap.

8. The method of claim 7 wherein dynamic discovery is  
30 limited to a scope assigned to a particular management  
customer.

9. The method of claim 1 further comprising:

determining whether to allow a reconfiguration operation requested by an administrative user in accordance with security authorization parameters associated with an administrative user.

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10. The method of claim 9 further comprising:

limiting reconfiguration operations requested by an administrative user to scopes assigned to a particular management customer.

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1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29 30 31 32 33 34 35 36 37 38 39 40 41 42 43 44 45 46 47 48 49 50 51 52 53 54 55 56 57 58 59 60 61 62 63 64 65 66 67 68 69 70 71 72 73 74 75 76 77 78 79 80 81 82 83 84 85 86 87 88 89 90 91 92 93 94 95 96 97 98 99 100

11. An apparatus for management of a distributed data processing system, wherein the distributed data processing system is managed on behalf of a plurality of management customers, the apparatus comprising:

5 means for representing the distributed data processing system as a set of scopes, wherein a scope comprises a logical organization of network-related objects;

means for associating each scope with a management customer, wherein each scope is uniquely assigned to a management customer, wherein each scope is uniquely associated with a set of configuration parameters for managing each scope;

10 means for managing the distributed data processing system as a set of logical networks, wherein a logical network comprises a set of scopes, and wherein each logical network is uniquely assigned to a management customer; and

15 means for allowing an administrative user to dynamically reconfigure logical networks within the distributed data processing system.

20 12. The apparatus of claim 11 further comprising:  
means for dynamically reconfiguring the distributed data processing system to introduce a new scope by logically dividing a pre-existing scope.

25 13. The apparatus of claim 12 wherein the new scope is introduced without physically introducing a new network, system, or endpoint to the distributed data processing system.

14. The apparatus of claim 11 further comprising:  
means for dynamically reconfiguring the distributed data processing system by logically moving a scope between management customers.

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15. The apparatus of claim 11 further comprising:  
means for dynamically reconfiguring the distributed data processing system to introduce a new management customer.

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16. The apparatus of claim 15 wherein the new management customer is introduced without physically introducing a new network, system, or endpoint to the distributed data processing system.

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17. The apparatus of claim 11 further comprising:  
means for dynamically discovering endpoints, systems, and networks within the distributed data processing system;  
means for correspondingly representing endpoints,

20 systems, and networks within the distributed data processing system as a set of endpoint objects, system objects, and network objects; and

25 means for logically organizing the endpoint objects, system objects, and network objects within a set of scopes, wherein each endpoint object, each system object, and each network object is uniquely assigned to a scope such that scopes do not logically overlap.

30 18. The apparatus of claim 17 wherein dynamic discovery is limited to a scope assigned to a particular management customer.

19. The apparatus of claim 11 further comprising:

means for determining whether to allow a reconfiguration operation requested by an administrative user in accordance with security authorization parameters associated with an administrative user.

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20. The apparatus of claim 19 further comprising:  
means for limiting reconfiguration operations requested  
by an administrative user to scopes assigned to a particular  
management customer.

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21. A computer program product on a computer readable medium for use in managing a distributed data processing system, wherein the distributed data processing system is managed on behalf of a plurality of management customers, 5 the computer program product comprising:

instructions for representing the distributed data processing system as a set of scopes, wherein a scope comprises a logical organization of network-related objects;

instructions for associating each scope with a 10 management customer, wherein each scope is uniquely assigned to a management customer, wherein each scope is uniquely associated with a set of configuration parameters for managing each scope;

instructions for managing the distributed data 15 processing system as a set of logical networks, wherein a logical network comprises a set of scopes, and wherein each logical network is uniquely assigned to a management customer; and

instructions for allowing an administrative user to 20 dynamically reconfigure logical networks within the distributed data processing system.

22. The computer program product of claim 21 further comprising:

instructions for dynamically reconfiguring the 25 distributed data processing system to introduce a new scope by logically dividing a pre-existing scope.

23. The computer program product of claim 22 wherein the 30 new scope is introduced without physically introducing a new network, system, or endpoint to the distributed data processing system.

24. The computer program product of claim 21 further comprising:

instructions for dynamically reconfiguring the distributed data processing system by logically moving a scope between management customers.

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25. The computer program product of claim 21 further comprising:

instructions for dynamically reconfiguring the distributed data processing system to introduce a new management customer.

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26. The computer program product of claim 25 wherein the new management customer is introduced without physically introducing a new network, system, or endpoint to the distributed data processing system.

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27. The computer program product of claim 21 further comprising:

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instructions for dynamically discovering endpoints, systems, and networks within the distributed data processing system;

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instructions for correspondingly representing endpoints, systems, and networks within the distributed data processing system as a set of endpoint objects, system objects, and network objects; and

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instructions for logically organizing the endpoint objects, system objects, and network objects within a set of scopes, wherein each endpoint object, each system object, and each network object is uniquely assigned to a scope such that scopes do not logically overlap.

28. The computer program product of claim 27 wherein dynamic discovery is limited to a scope assigned to a particular management customer.

5 29. The computer program product of claim 21 further comprising:

10 instructions for determining whether to allow a reconfiguration operation requested by an administrative user in accordance with security authorization parameters associated with an administrative user.

30. The computer program product of claim 29 further comprising:

15 instructions for limiting reconfiguration operations requested by an administrative user to scopes assigned to a particular management customer.